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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/676,257	10/02/2003	Eldad Taub	25749	3469

20529 7590 03/27/2006

NATH & ASSOCIATES
112 South West Street
Alexandria, VA 22314

EXAMINER

O CONNOR, CARY E

ART UNIT	PAPER NUMBER
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3732

DATE MAILED: 03/27/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/673,257	TAUB ET AL	
	Examiner	Art Unit	
	Cary E. O'Connor	3732	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
 - If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
 - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
 - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 02 October 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-27 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-27 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 02 October 2003 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date <u>6-23-04</u> | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1, 2, 6, 8, 21, 22, 24 and 26 are rejected under 35 U.S.C. 102(e) as being anticipated by Amar (2004/0197740). Amar teaches a method for creating a physical teeth model comprising providing a virtual three dimensional representation of a patient's dentition that comprises a region of the teeth that includes a tooth stump (paragraphs 0041 and 0043), and preparing a positive physical model of the jaws from a blank base on information from the 3D image (paragraph 0058). A computer driven machine prepares the physical model (abstract).

Claims 1, 2, 4-6, 8, 10-12, 21, 22, 24 and 26 are rejected under 35 U.S.C. 102(e) as being anticipated by Durbin et al (2002/0064759). Durbin teaches a method for creating a physical teeth model comprising providing a virtual three dimensional representation of a patient's dentition that comprises a region of the teeth that includes a tooth stump (paragraph 0027, lines 3-6), and preparing a positive physical model of the jaws from a blank base on information from the 3D image (paragraph 27, lines 18-20). A computer driven machine prepares the physical model (paragraph 0029). A 3D

model of the crown is generated and a computer driven milling machine prepares a physical crown based on the 3D model of the crown (paragraph 0024).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 3 and 9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Durbin et al (2002/0064759) in view of Marshall et al (2002/0081554). Durbin does not necessarily disclose that the model is made of plaster. Marshall teaches that dental models can be machined out of plaster (paragraph 0066). It would have been obvious to one of ordinary skill in the art at the time the invention was made to use plaster to form the models of Durbin, in view of the teaching of Marshall, since it is so common to form dental models from plaster.

Claims 7, 23, 25 and 27 are rejected under 35 U.S.C. 103(a) as being unpatentable over Durbin et al (2002/0064759) in view of Metzler (4,521,188). The model of Durbin is not a negative model. Metzler teaches the use of a negative model in the first paragraph of column 1. It would have been obvious to one of ordinary skill in the art at the time the invention was made to form a negative model as opposed to the positive model formed in the method of Durbin, in view of Metzler, as the negative and positive models are interchangeable.

Claims 13, 15-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Durbin et al (2002/0064759) in view of McPhee (2,621,406). The models of Durbin do not include markings to provide an indication of proper alignment. McPhee shows physical dental models for mounting on an articulator. The models include markings 69 to aid in proper alignment of the models relative to one another. It would have been obvious to one of ordinary skill in the art at the time the invention was made to provide the models of Durbin with markings as taught by McPhee, in order to make it easier to position the models in proper alignment.

Claims 14, 18-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Durbin et al (2002/0064759) in view of Metzler (4,521,188) and McPhee (2,621,406). The model of Durbin is not a negative model. Metzler teaches the use of a negative model in the first paragraph of column 1. It would have been obvious to one of ordinary skill in the art at the time the invention was made to form a negative model as opposed to the positive model formed in the method of Durbin, in view of Metzler, as the negative and positive models are interchangeable. Also, The models of Durbin do not include markings to provide an indication of proper alignment. McPhee shows physical dental models for mounting on an articulator. The models include markings 69 to aid in proper alignment of the models relative to one another. It would have been obvious to one of ordinary skill in the art at the time the invention was made to provide the models of Durbin with markings as taught by McPhee, in order to make it easier to position the models in proper alignment.

Drawings

The drawings are objected to because Figures 5-7 are missing.

Corrected drawing sheets are required in reply to the Office action to avoid abandonment of the application. The replacement sheet(s) should be labeled "Replacement Sheet" in the page header (as per 37 CFR 1.84(c)) so as not to obstruct any portion of the drawing figures. If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Cary E. O'Connor whose telephone number is 571-272-4715. The examiner can normally be reached on M-Th 7:00-3:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kevin Shaver can be reached on 571-272-4720. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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Cary E. O'Connor
Primary Examiner
Art Unit 3732

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